GALLIUM NITRIDE BASED SEMICONDUCTOR LIGHT EMITTING ELEMENT AND ITS MANUFACTURING METHOD

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- international: H01S5/22; H01L33/00

- european:

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Abstract of **JP2001217503**

PROBLEM TO BE SOLVED: To form a GaN based semiconductor laser of high reliability with superior yield. SOLUTION: After an N-AlGaN clad layer is deposited on a substrate, the clad layer is worked in a ridge type, and a ridge side surface and a recess bottom part are covered with SiNx. The C face of the clad layer is made seed crystal, and an N-optical guide layer, an active layer, a P-light guide layer, a P-clad layer and a P-GaN layer are grown, thereby forming the GaN based semiconductor laser. As a result, a single transverse mode laser of high reliability can be formed with superior yield.